File
342.3
Buprestis
BMNR 342.3
1410

xxxx 3141

4500 Jan. 27, 1964

Mr. Paul S. Ousley
01960 S.W. Palatine Hill Road
Portland, Oregon 97219

Dear Paul:

I have checked and am now reporting on the several samples of wood and insects that you referred to me on January 16, 1964. This report concerns the identity of the insects and is not an attempt to evaluate their relative importance in the pole lines from which they were taken. Such an evaluation would have to be based on an actual examination and sampling of the poles.

My notes on the origin of the samples are not complete. I hope you will be able to figure out where the samples were obtained.

Sample 1.

Description: X-section about 1-foot long. Outside heavily creosoted. Inside very rotten, heavily mined by borers of undetermined kind, possibly Buprestis. Now extensively infested with termites.

Identification: Dampwood termite, Zootermopsis angusticollis. This is not a very destructive species. In poles it likely speeds the spread of rot to some degree by opening the interior to moisture.

Sample 2.

Description: X-section about 1-foot long. Rotten around hole that had been bored through the pole. Wood otherwise dry and case-hardened. No evident chemical treatment. Buprestis had bored extensively, both in the dry sound portion and in the rotten portion.

Identification: Buprestis aurulenta. One live adult and one dead adult enabled positive identification. Approximately 30 living larvae were cut from the sample and 23 of them have been introduced into individual blocks of Douglas-fir for study. B. aurulenta readily attacks and develops in checked, air-dry, sound Douglas-fir and pine. It takes many years to develop from the egg to the adult. I surmise that any part of a pole above groundline might be repeatedly attacked. The sample also contained several

larvae and dead adults of Temnochila. This is the blue-green beetle that I pointed out as being predaceous on wood borers, in this case obviously on Buprestis.

Sample 3.

Description: Small piece of Douglas-fir and one pink larva in a plastic vial labeled "No. 1054, Grants Pass-Cave Junction." The wood contained an open hole caused by a wood boring beetle.

Identification: The larva was a clerid. These are predaceous beetles that feed both as larvae and adults on various wood borers. Their habits are similar to those of Temnochila. The borer that caused the hole in the wood could have been Buprestis, but there was no means of establishing this with certainty.

Sample 4.

Description: Fragments of a blue-green beetle in a plastic vial labeled "PP&L, Myrtle Creek - Bob Adams. 1/7/64. Pole No. C 2366. 1947 VT Fir set on (not below G/L) 8" x 8" x 11' PDF stub. 40' set in 12 KV no. of Riddle. Removed 12/9/63."

Identification: Temnochila virescens, a predator on wood boring beetle, as indicated above.

Sample 5.

Description: Two dead, dried, and blackened larvae in a plastic vial labeled "Pole 1070, Grants Pass-Cave Junction." 1 dead, dried, blackened cerambycid larva in larger sample of wood "1070, Grants Pass-Cave Junc."

Identification: The larvae were those of a round headed woodborer. Their state of advanced deterioration did not permit positive identification. Borers of this type normally would be found in the basal part of a pole. They require considerable moisture and characteristically occur where there is considerable rot.

Sample 6.

Description: A small piece of Douglas-fir with a small green buprestid that had died on its way to the surface. The sample was labeled "1070", hence may have come from the same pole as sample #5.

Identification: Chrysophana placida. This flat-headed borer resembles Buprestis aurulenta, but is much smaller. Its habits also are presumed similar. It commonly attacks dead pine and true fir. This is our first record of its attacking Douglas-fir. I surmise that it would most likely occur in the dry upper part of poles. I doubt that it would be of much economic significance.

Sample 7.

Description: A core of Douglas-fir in an unlabeled vial. A borer hole and some larval mines, possibly of Buprestis, showed in the core. A yellow-green fungus had developed on some of the larval borings.

Identification: None possible.

As stated when you were here, I would like to follow up on this problem this coming spring or summer by examining representative poles. I would particularly like to sample some of the poles that have been replaced.

Yours sincerely,

R. L. FURNISS, Chief
Div. of Forest Insect Research

RLFurniss:wt